

Urban Renaissance

From Brass Manufacturing to Uptown Brass Center

by Christopher Olson, Ronald Bursek, and Martina Schlauch Jones

Bearing the marks of more than a century of molding, casting, and forming of brass and copper, a 30-acre former manufacturing site in Kenosha, WI, was not the kind of property that was immediately attractive to real estate developers. The inherent risks associated with transforming contaminated industrial sites into property ready for nonindustrial uses such as residential and retail have historically been prohibitive, leaving many potential sites idle. The key to transforming the Kenosha Brass Mill was the ability to effectively manage the unknown or unidentified factors that generate the inherent risks in site remediation. By successfully removing the uncertainties associated with remediation, this former brownfields property is fast becoming a fully formed retail and residential center, providing a source of income, urban revitalization, and tax base for the neighboring community.

BACKGROUND

The Kenosha Brass Mill, formerly the American Brass site, is located on approximately 30 acres in a mixed-use residential and commercial area of Kenosha, WI, less than one-half mile from Lake Michigan (see Figure 1). The industrial facility consisted of a manufacturing plant, a two-story office building with garage and employee parking lot, and an off-site wastewater treatment plant. The original facility was constructed in 1886 and was in continuous operation until November 1999, manufacturing a variety of brass and copper products, including metal strips, tubes, rods, bars, wire, and stampings.

Over its 113 years of operation, the facility underwent several changes in ownership:

- **1886:** The Chicago Brass Co. constructs the American Brass site.
- **1912:** The Chicago Brass Co. dissolves and the facility becomes part of the American Brass Co. (ABC).
- **1922:** The Anaconda Mining Co. (AMC) purchases ABC.
- **1977:** The Atlantic Richfield Co. purchases AMC.
- **1985:** The facility is resold to American Brass Co., L.P. (ABC).
- **1990:** Outokumpu of Finland purchases the assets of ABC, including the Kenosha facility, and forms Outokumpu Copper Kenosha Inc. (OCK).

When Atlantic Richfield sold the facility to ABC in 1985 as part of its metals unit divestiture, the purchase agreement included an environmental indemnity that covered pre-existing environmental conditions. These indemnity rights were transferred to the new owners when ABC was acquired by OCK in 1990.

THE CHALLENGE

Various environmental investigations were conducted after the transfer in ownership in 1990. It was found that volatile organic compounds (VOCs), specifically chlorinated solvents, were the main contaminants of concern in the soil and groundwater at the site. Other contaminants included metals (mainly lead and copper) and polycyclic aromatic hydrocarbons (PAHs). The engineering costs for environmental cleanup and demolition of the site were estimated to be approximately \$15 million. In 2000, the City of Kenosha

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indicated its desire to see the site redeveloped for non-industrial use, envisioning a commercial/retail center to help support the city's plan to revitalize a nearby inner city residential neighborhood. The city's interest in the redevelopment of the site provided a strong catalyst to move the involved parties closer to reaching a solution.

With an incentive in place, the parties agreed to work together to meet the city's redevelopment needs. Specifically, the companies involved (i.e., Atlantic Richfield and

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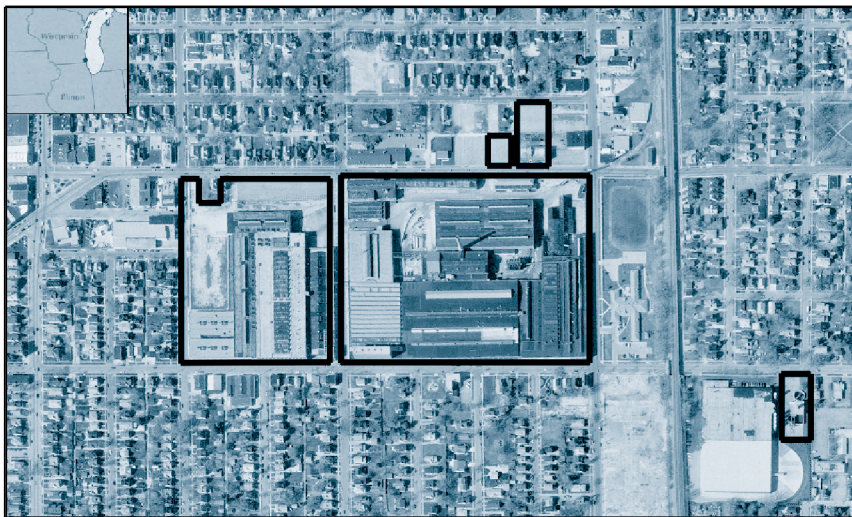


Figure 1. The former American Brass site (pre-remediation).

OCK) agreed to share all past and future remediation costs at the site, resolve the indemnity claim issue, and upon completion, transfer ownership of the property to the City of Kenosha.

THE SOLUTION

Both Atlantic Richfield and OCK desired a clean break from the site that would absolve them of any future liability, and although the city was interested in obtaining the property for redevelopment, it was not willing to accept the existing environmental liability associated with the site. Therefore, the companies investigated an insured, fixed-price cleanup option for the site and agreed to use TRC Companies Inc.'s (TRC) Exit Strategy[®] solution, wherein all the environmental

liability associated with the site would be fully transferred to TRC and backed by an environmental insurance policy. The \$10.1-million cost associated with this option was not only financially attractive, but also offered other legal protections that traditional remediation solutions cannot provide, such as protection against changes in regulation, third-party actions, and discovery of previously unknown conditions.

Consequently, in March 2002, Atlantic Richfield, OCK, and the City of Kenosha entered into a contract with TRC. As a part of the contract, a 30-year insurance policy was purchased providing coverage for twice the estimated cleanup cost, as well as additional coverage for any unknown conditions. The city welcomed the contract and agreed to contribute \$5 million toward the cost of the

cleanup in exchange for having the ownership of the property transferred to the city. (Subsequently, the city was able to leverage \$2 million in brownfields grants from the U.S. Environmental Protection Agency and sought to finance the balance of its \$5-million contribution through tax incremental financing.)

Under the Exit Strategy[®] contract, TRC agreed to demolish the site's existing building structures and assume all future environmental obligations for the property in perpetuity. In addition, the contract specified that TRC was to complete the demolition by March 1, 2003, and remediate the property to commercial standards by August 1, 2004.

All parties benefited from the agreement. The guaranteed, fixed price for the demolition and remediation work was significantly lower than the original \$15-million cost estimate and

included environmental protections that provided additional cost certainty. Both former site owners were relieved of their remediation responsibilities and of a non-performing asset. At the same time, the City of Kenosha acquired title to a clean, remediated site ready for future redevelopment.

REDEVELOPMENT PLANNING: FIRST THINGS FIRST

Because of the former American Brass site's location—less than 1 mile from the city's central business district, Kenosha Harbor, and Lake Michigan—its future redevelopment had to fit within the context of the city's overall development strategy. The City of Kenosha has successfully completed other brownfields redevelopment projects in sensitive areas, including the acclaimed Harbor Park development on the shores

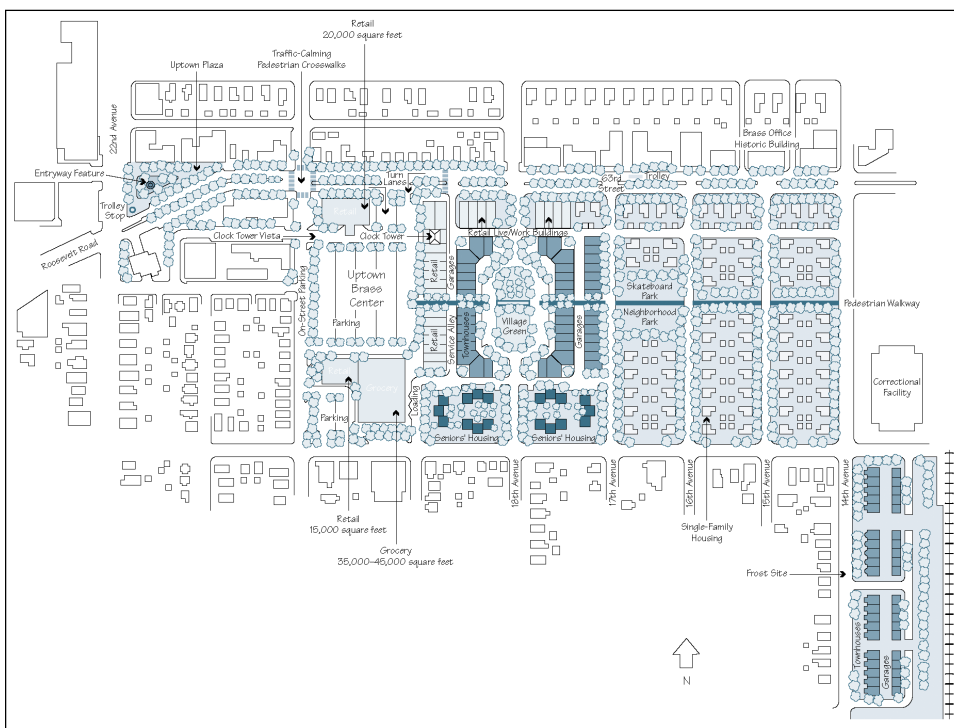


Figure 2. The ULI panel's recommended land use plan.





Figure 3. The site post-remediation and awaiting redevelopment.

of Lake Michigan (formerly the site of a large mattress manufacturer and later an automobile and engine manufacturer) and was eager to incorporate the former American Brass Site into its redevelopment master plan.

In 2002, the city enlisted the assistance of the Urban Land Institute (ULI) to determine the most appropriate and successful reuse of the site. ULI is a nonprofit research and education organization that promotes responsible leadership in the use of land to enhance the environment. A ULI advisory services panel was established and was charged with three primary tasks:

1. determine the proper and successful reuse of the site;
2. create the proper strategy for implementation; and
3. integrate the reuse strategy into the urban fabric of Kenosha.

In June 2002, the members of the panel received an in-depth briefing on the site's history and a tour of the site. They held meetings with city representatives, interviewed approximately 80 community representatives (including residents in the neighboring community), and reviewed a stack of files and briefing materials. The ULI panel assimilated this information to form an assessment of the city's issues and provide recommendations for the site's redevelopment.

In addition, the panel conducted a market evaluation to determine the potential for the city's intended development of a retail shopping center anchored by a supermarket, and the market opportunity for other land uses at the site. Through interviews, the panel learned that residents in the Lincoln and Columbus neighborhoods, two of Kenosha's older neighborhoods, had a strong interest in maintaining the immediate area's moderate-income character, while increasing the availability of a wider range of housing choices in the surrounding area. The residents added that they needed better access to supermarkets and drugstores.

Melding the city's vision, the residents' needs and desires, the environmental encumbrances of the site, and the environmental regulatory framework, the panel recommended redeveloping the former American Brass site as a mixed-use

urban village that would include commercial retail, residential, and recreational amenities (see Figure 2). The cornerstone of the project would be a 150,000 sq ft shopping center anchored by a mid-sized grocery store. The vision included a "village green" surrounded by multi-family attached housing units, providing a transition from the commercial area to the small, detached single-family homes consistent with the scale of the surrounding neighborhoods.

IMPLEMENTING THE SOLUTION

TRC's obligations extended through all phases of the project, including engineering, procurement, demolition, remedial design, remedial implementation, and long-term operation, maintenance, and monitoring.

Demolition

With more than 1,000,000 sq ft of buildings to demolish by March 2003, a formidable task loomed. At the time of contract signing (March 2002), the existing buildings still contained foundry equipment that was being marketed to other foundries. The historical uses of the buildings had not been collated into one document, so a history of operations had to be quickly compiled to assess pre-demolition conditions. Also, a multitude of permits had to be obtained prior to the first brick being removed from the site. Prior to demolition of the buildings, several contaminants had to be removed, properly handled, and disposed. The contaminants included extensive site-wide asbestos-containing materials, metal-contaminated dust from process areas, creosote-treated wood block flooring, PCB-contaminated building materials, mercury, and various universal wastes.

TRC subcontracted Brandenburg Industrial Service Co. to complete the demolition phase of the project. Demolition was initiated in July 2002. During the course of the demolition activities, approximately 700,000 bricks were reclaimed for future reuse. In addition, 14,000 tons of cast iron and structural steel and 1000 tons of copper, stainless steel, and aluminum were recycled. An estimated 80,000 tons of clean concrete were crushed and placed as backfill into the site. Salvaged materials from the site included 575 ceiling light fixtures and six overhead crane trolley assemblies.

Environmental Activities

To minimize long-term remediation demands, "hot spot" soil areas were excavated during demolition activities to remove potentially contaminated source areas from the site. Nonhazardous soils were transported off-site for disposal. Hazardous soils, originating from one of the facility's degreasing operations areas, were treated on-site using indirect heat volatilization to reduce volatile contaminants to nonhazardous levels. The treated soils were then taken off-site for disposal at a nonhazardous waste disposal facility.

After completion of the demolition (see Figure 3), three



Figure 4. An artist's rendering of the Plaza at Uptown Brass Center.

rounds of additional investigatory activities were conducted at the site. In September/October 2003, 53 soil borings and 15 new groundwater wells were installed and sampled in accordance to a work plan prepared and submitted to Wisconsin Department of Natural Resources (WDNR). WDNR then requested additional soil and groundwater sampling be conducted to address specific concerns. In December 2003, 40 soil borings and eight new groundwater wells were installed and sampled. Following the department's review of the December 2003 results, and with input regarding the planned development at the site, WDNR requested additional data be collected for further review. In March 2004, six new groundwater wells and 18 soil borings were installed and sampled.

After WDNR's review of the March 2004 data was completed, conferences to discuss the remedial approach for the site in the context of the intended development ensued between the city, the developer, WDNR, and TRC. After extensive dialog, the approach was defined and agreed upon and a remedial action plan (RAP) was submitted to WDNR for the west portion of the site on August 26, 2004. The RAP included a detailed material management plan to address how soil and groundwater encountered during construction of the development would be managed. The RAP was conditionally approved by the WDNR on October 7, 2004. In December 2004, additional soil excavation was conducted in the northwest area of the site and a round of groundwater sampling was performed to continue evaluating the groundwater quality and natural attenuation of constituents in the groundwater. Groundwater monitoring is being performed on a regular basis according to the approved RAP, until WDNR concurs that stable groundwater conditions have been achieved.

COMMUNITY RELATIONS MAKE A DIFFERENCE

Understanding the ongoing needs of the community and the immediate neighborhood has been critical in the development of the project. The City of Kenosha and the WDNR also have specific needs and goals that must be met as part of ensuring

project success. TRC teamed with the city to implement a comprehensive community relations program. Before any project activities began, a formal public meeting was held to inform interested parties of the plans for the project and to solicit feedback and questions. In addition, a fact sheet was prepared and distributed to the community that provided information about the scope and anticipated schedule of the project.

Periodic community meetings were held to provide an informal setting for neighbors and other interested parties to ask questions and get project updates. Regular project newsletters were sent to neighborhood residents, city employees, and other interested parties who had requested to receive project updates. Also, a

direct toll-free phone number was provided for use by anyone with questions, complaints, or compliments, and regular dialogue with the local media allowed residents to see the project progress from all perspectives. Due to the success of the community relations' activities, the project has received praise from both the city and residents alike.

MAKING THE PLAN A REALITY

On behalf of the city, the Redevelopment Authority of the City of Kenosha issued a request for proposals to develop the western portion of the site in May 2003. Prospective developers were interviewed and the team of Professional Realty and Development Corp. (PRDC; Middleton, WI) and The Kubala Washatko Architects (Cedarburg, WI) was selected in August 2003 as the preferred developer for the site.

On February 7, 2005, the city council unanimously approved a sale agreement that allowed PRDC to purchase a 16-acre parcel of the former American Brass site from the city. PRDC's development, the Uptown Brass Center, will be anchored by a 55,000 sq ft grocery store. A related development agreement requires PRDC to develop the supermarket in the southwest area of the parcel before any other retail and residential development can proceed. Other planned buildings include retail space and apartment units (see Figure 4). The eastern portion of the site will be the subject of future requests for development proposals by the city.

THE BOTTOM LINE: A SUCCESS STORY

In the end, all parties involved benefited from the Exit Strategy® solution. Atlantic Richfield and OCK relieved themselves of a potential \$15-million environmental liability by securing an agreement to pay only \$5.1 million, after including the city's contribution, a combination of tax incremental financing and brownfields grants. The City of Kenosha received 30 acres of "clean" property ready for development, and the residents now have a community project they can not only be proud of, but also say they had a hand in developing. **em**